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Appl. No. 10/711,392
Amdt. dated Oct. 04, 2005
Reply to Office action of 07/05/2005

Listing of Claims:

1. (Currently amended) A chemical mechanical polishing (CMP) process comprising:
providing a CMP tool having a first polishing platen and a second polishing platen;
providing a substrate having thereon a top-bulk metal layer and stacked directly on a
5 lower barrier layer;
placing said substrate on said first polishing platen with said top metal layer in
contact with said first polishing platen;
dispersing, onto said first polishing platen, a first slurry being selective to said
barrier layer;
10 polishing said top-bulk metal layer on said first polishing platen at a substantial
constant removal rate to expose said barrier layer, wherein an entire thickness of said top
metal layer is polished at said constant removal rate and said substrate is not removed
from said first polishing platen until said barrier layer is exposed by utilizing a first platen
and a first slurry being selective to said barrier layer; and
15 after removing said top metal layer, placing said substrate on said second polishing
platen and polishing said exposed barrier layer by using [[a]] said second polishing platen
and a second slurry.
2. (Original) The chemical mechanical polishing process according to claim 1 wherein
20 said first slurry has a copper to barrier polishing selectivity of greater than 30.
3. (Original) The chemical mechanical polishing process according to claim 2 wherein
said first slurry has a copper to barrier polishing selectivity of above 100.
- 25 4. (Original) The chemical mechanical polishing process according to claim 1 wherein
said first slurry contains alumina.

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5. (Original) The chemical mechanical polishing process according to claim 1 wherein said second slurry contains alumina.

6. (Original) The chemical mechanical polishing process according to claim 1 wherein
5 said first slurry contains silica.

7. (Original) The chemical mechanical polishing process according to claim 1 wherein said second slurry contains silica.

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